

The Chickasaw Nation Comments to the Federal Communications Commission's Notice of Inquiry on the effects of communications towers on migratory birds

Communication towers have several beneficial uses to the modern society. It is understandable that the communication towers are and will continue to be vital tools to transport information by radio, cell phones, broadcast televisions and personal communication services. However the Chickasaw Nation shares the concerns of the U.S. Fish and Wildlife Service pertaining to the exponential rate of growth of communication towers across the United States. The estimated increase of communication towers six to eight percent annually is alarming. (U.S. Fish and Wildlife Service) This increase could impact several migratory bird populations which would be detrimental to the cultural and religious interests of the Chickasaw Nation.

The lack of research within the borders of the present Chickasaw Nation jurisdictional area and no standard protocol in use for documenting communication tower bird kills within the ancestral regions in the southeastern United States provides little or no information for the Chickasaw Nation to make a decision as to what extent the tower kills are having on Chickasaw Nation cultural and religious interest for future generations. (U.S. Fish and Wildlife Service) Therefore the Chickasaw Nation supports any research and/or methods to reduce the number of communication tower bird kills.

The Chickasaw Nation hopes the following information provided concerning tribal cultural sites protocol, migratory birds of Oklahoma and a listing of culturally significant bird species will enable the Federal Communication Commission to research the effects of communication towers on migratory birds.

The ancestral lands of the Chickasaw Nation range across the southeastern United States, including the present jurisdictional area in south central Oklahoma. The probability that cultural sites, human remains and/or associated grave goods of great cultural and social importance to the Chickasaw people is high and may be encountered, inadvertently, during an investigation of communication towers and migratory bird collisions. In the event that during a study of communication towers and migratory bird collisions any inadvertent finds of human remains, sites and/or artifacts which potentially may be associated with the Chickasaw Nation, the researching contractor or contractors are required to take the following steps, in compliance with applicable federal laws and the requirements of the Chickasaw Nation. (Cfr, NAGPRA, 25 USC 3001, et. seq.; and NHPA, 16 USC 470 et. seq. [and 36 CFR 800].)

- Cease research study immediately.
- Take reasonable and immediate steps to stabilize, cover and protect the site from environmental destruction and/or vandalism, and ensure the confidentiality of the site.
- Call in a source of technical expertise or other academic investigator to confirm the find.
- If the cultural site, human remains and/or associated grave goods are confirmed as Native American, notify the Chickasaw Nation cultural resources department immediately.
- Follow up the telephone notification with a written notification mailed within three days of determination. Research contractor is encouraged to use USPS Registered Mail, Return Receipt Requested.
- Provide the Nation with the opportunity to make a written determination of its desires concerning the disposition of the human remains and associated grave goods, and to make physical

disposition of the human remains and associated grave goods within the traditional cultural requirements of the Chickasaw Nation. In this regard, the Chickasaw Nation agrees to confer with the descendent tribes of the southeast, in order to provide its determination in a timely manner and minimize the research contractor's project delay.

- Provide the Chickasaw Nation the opportunity to comment, in writing, concerning the treatment, mitigation and/or eligibility of the cultural site for nomination to the National Register of Historic Places of the cultural site.

The Chickasaw Nation ancestral lands to the east and the present jurisdictional area in Oklahoma are associated with two migratory flyways as designated by the United States Fish and Wildlife Service. The present Chickasaw Nation jurisdiction is located in the Central flyway while the ancestral lands are within the Mississippi flyway. Most of the migratory bird collisions have been documented in the eastern United States, with only three recorded collisions near the present jurisdictional area of the Chickasaw Nation in Oklahoma therefore there is not sufficient evidence indicating what species and what amount of the culturally significant migratory birds are being harmed by collisions with communication towers. The latest documented migratory bird collisions with communication towers near the present Chickasaw Nation jurisdictional area were during the years of 1975, 1976 and 1977 by J.L. Norman in Coweta Oklahoma. (**Communication Towers: A Deadly Hazard to Birds**) Since this time little else has been recorded as to migratory bird deaths by communication towers in the state of Oklahoma.

A survey of Neo-tropical migratory birds was conducted by the George M. Sutton Avian Research Center at Camp Gruber Training Center in eastern Oklahoma. The survey was coordinated during May and June of 1998 and 1999 by David A Wiedenfeld and Dan L. Reinking using 89 Land Condition Trend Analysis (LCTA) plots to observe and count the Neo-tropical migratory bird populations. This survey provides a recent representation as to the migratory bird species found in Oklahoma. (**Camp Gruber Bird Survey**)

The following table is a list of bird species surveyed by the George M. Sutton Avian Research Center.

Table 1

<u>Species</u>	<u>Scientific Name</u>	<u>Family</u>
Great Egret	<i>Ardea alba</i>	Ardeidae
Cattle Egret	<i>Bubulcus ibis</i>	Ardeidae
Little Blue Heron	<i>Egretta caerulea</i>	Ardeidae
Black Vulture	<i>Coragyps atratus</i>	Cathartidae
Turkey Vulture	<i>Cathartes aura</i>	Cathartidae
Northern Harrier	<i>Circus cyaneus</i>	Accipitridae
Cooper's Hawk	<i>Accipiter cooperii</i>	Accipitridae
Red-shouldered Hawk	<i>Buteo lineatus</i>	Accipitridae
Broad-winged Hawk	<i>Buteo platypterus</i>	Accipitridae
Red-tailed Hawk	<i>Buteo jamaicensis</i>	Accipitridae
Wild Turkey	<i>Meleagris gallopavo</i>	Phasianidae

Northern Bobwhite	<i>Colinus virginianus</i>	Odontophoridae
Killdeer	<i>Charadrius vociferus</i>	Charadriidae
Mourning Dove	<i>Zenaida macroura</i>	Columbidae
Yellow-billed Cuckoo	<i>Coccyzus americanus</i>	Cuculidae
Great Horned Owl	<i>Bubo virginianus</i>	Strigidae
Barred Owl	<i>Strix varia</i>	Strigidae
Common Nighthawk	<i>Chordeiles minor</i>	Caprimulgidae
Chuck-will's-widow	<i>Caprimulgus carolinensis</i>	Caprimulgidae
Chimney Swift	<i>Chaetura pelagica</i>	Apodidae
Ruby-throated Hummingbird	<i>Archilochus colubris</i>	Trochilidae
Red-headed Woodpecker	<i>Melanerpes erythrocephalus</i>	Picidae
Red-bellied Woodpecker	<i>Melanerpes carolinus</i>	Picidae
Downy Woodpecker	<i>Picoides pubescens</i>	Picidae
Hairy Woodpecker	<i>Picoides villosus</i>	Picidae
Northern Flicker	<i>Colaptes auratus</i>	Picidae
Pileated Woodpecker	<i>Dryocopus pileatus</i>	Picidae
Olive-sided Flycatcher	<i>Contopus cooperi</i>	Tyrannidae
Acadian Flycatcher	<i>Empidonax virescens</i>	Tyrannidae
Least Flycatcher	<i>Empidonax minimus</i>	Tyrannidae
Eastern Phoebe	<i>Sayornis phoebe</i>	Tyrannidae
Great Crested Flycatcher	<i>Myiarchus crinitus</i>	Tyrannidae
Eastern Kingbird	<i>Tyrannus tyrannus</i>	Tyrannidae
Scissor-tailed Flycatcher	<i>Tyrannus forficatus</i>	Tyrannidae
White-eyed Vireo	<i>Vireo griseus</i>	Vireonidae
Bell's Vireo	<i>Vireo bellii</i>	Vireonidae
Yellow-throated Vireo	<i>Vireo flavifrons</i>	Vireonidae
Blue-headed Vireo	<i>Vireo solitarius</i>	Vireonidae
Warbling Vireo	<i>Vireo gilvus</i>	Vireonidae
Red-eyed Vireo	<i>Vireo olivaceus</i>	Vireonidae
Blue Jay	<i>Cyanocitta cristata</i>	Corvidae
American Crow	<i>Corvus brachyrhynchos</i>	Corvidae
Fish Crow	<i>Corvus ossifragus</i>	Corvidae
Purple Martin	<i>Progne subis</i>	Hirundinidae
Northern Rough-winged Swallow	<i>Stelgidopteryx serripennis</i>	Hirundinidae
Barn Swallow	<i>Hirundo rustica</i>	Hirundinidae
Carolina Chickadee	<i>Poecile carolinensis</i>	Paridae
Tufted Titmouse	<i>Baeolophus bicolor</i>	Paridae
White-breasted Nuthatch	<i>Sitta carolinensis</i>	Sittidae

Carolina Wren	<i>Thryothorus ludovicianus</i>	Troglodytidae
Marsh Wren	<i>Cistothorus palustris</i>	Troglodytidae
Sedge Wren	<i>Cistothorus platensis</i>	Troglodytidae
Blue-gray Gnatcatcher	<i>Poliophtila caerulea</i>	Sylviidae
Eastern Bluebird	<i>Sialia sialis</i>	Turdidae
Gray-cheeked Thrush	<i>Catharus minimus</i>	Turdidae
Swainson's Thrush	<i>Catharus ustulatus</i>	Turdidae
Wood Thrush	<i>Hylocichla mustelina</i>	Turdidae
Gray Catbird	<i>Dumetella carolinensis</i>	Mimidae
Northern Mockingbird	<i>Mimus polyglottos</i>	Mimidae
Brown Thrasher	<i>Toxostoma rufum</i>	Mimidae
Cedar Waxwing	<i>Bombycilla cedrorum</i>	Bombycillidae
Tennessee Warbler	<i>Vermivora peregrina</i>	Parulidae
Nashville Warbler	<i>Vermivora ruficapilla</i>	Parulidae
Northern Parula	<i>Parula americana</i>	Parulidae
Yellow Warbler	<i>Dendroica petechia</i>	Parulidae
Yellow-rumped Warbler	<i>Dendroica coronata</i>	Parulidae
Yellow-throated Warbler	<i>Dendroica dominica</i>	Parulidae
Prairie Warbler	<i>Dendroica discolor</i>	Parulidae
Black-and-white Warbler	<i>Mniotilta varia</i>	Parulidae
American Redstart	<i>Setophaga ruticilla</i>	Parulidae
Prothonotary Warbler	<i>Protonotaria citrea</i>	Parulidae
Ovenbird	<i>Seiurus aurocapillus</i>	Parulidae
Louisiana Waterthrush	<i>Seiurus motacilla</i>	Parulidae
Kentucky Warbler	<i>Oporornis formosus</i>	Parulidae
Common Yellowthroat	<i>Geothlypis trichas</i>	Parulidae
Yellow-breasted Chat	<i>Icteria virens</i>	Parulidae
Summer Tanager	<i>Piranga rubra</i>	Thraupidae
Field Sparrow	<i>Spizella pusilla</i>	Emberizidae
Savannah Sparrow	<i>Passerculus sandwichensis</i>	Emberizidae
Grasshopper Sparrow	<i>Ammodramus savannarum</i>	Emberizidae
Henslow's Sparrow	<i>Ammodramus henslowii</i>	Emberizidae
Lincoln's Sparrow	<i>Melospiza lincolnii</i>	Emberizidae
Chipping Sparrow	<i>Spizella passerina</i>	Emberizidae
Lark Sparrow	<i>Chondestes grammacus</i>	Emberizidae
White-crowned Sparrow	<i>Zonotrichia leucophrys</i>	Emberizidae
Northern Cardinal	<i>Cardinalis cardinalis</i>	Cardinalidae
Rose-breasted Grosbeak	<i>Pheucticus ludovicianus</i>	Cardinalidae

Blue Grosbeak	<i>Guiraca caerulea</i>	Cardinalidae
Indigo Bunting	<i>Passerina cyanea</i>	Cardinalidae
Painted Bunting	<i>Passerina ciris</i>	Cardinalidae
Dickcissel	<i>Spiza americana</i>	Cardinalidae
Red-winged Blackbird	<i>Agelaius phoeniceus</i>	Icteridae
Eastern Meadowlark	<i>Sturnella magna</i>	Icteridae
Common Grackle	<i>Quiscalus quiscula</i>	Icteridae
Brown-headed Cowbird	<i>Molothrus ater</i>	Icteridae
Orchard Oriole	<i>Icterus spurius</i>	Icteridae
Baltimore Oriole	<i>Icterus galbula</i>	Icteridae
American Goldfinch	<i>Carduelis tristis</i>	Fringillidae

The Camp Gruber Bird Survey also contained migratory bird species that have significant cultural and religious interests to the Chickasaw Nation. The following table contains migratory bird species culturally significant to the Chickasaw Nation.

Table 2. Migratory Birds Culturally Significant to the Chickasaw Nation

Common Name	Scientific Name
Bald Eagle	<i>Haliaeetus leucocephalus</i>
Northern Cardinal	<i>Cardinalis cardinalis</i>
Eastern Bluebird	<i>Sialia sialis</i>
Sandhill Crane	<i>Grus canadensis</i>
Whooping Crane	<i>Grus americana</i>
Red-winged Blackbird	<i>Agelaius phoeniceus</i>
Little Blue Heron	<i>Egretta caerulea</i>
Red-headed Woodpecker	<i>Melanerpes erythrocephalus</i>
Whip-Poor-Will	<i>Caprimulgus vociferus</i>
Scissor-tailed Flycatcher	<i>Tyrannus forficatus</i>
Trumpeter Swan	<i>Cygnus buccinator</i>
Northern Mockingbird	<i>Mimus polyglottos</i>

Attached are pictures of cultural significant birds to the Chickasaw Nation. ([Birds of Oklahoma Photo Gallery](#))



Little Blue Heron

Egretta caerulea

Description: 25-30" Adult slate blue with maroon neck, immatures white, bill grayish with black tip, legs greenish, similar to smaller Snowy, purplish head and neck, both sexes similar

Nesting: 3-5 pale blue or green eggs on sticks built in a tree or small bush, nests in colonies

Voice: usually silent but squawks when alarmed, various croaks and noises at nesting colonies

Notes: Stalks prey quietly in shallow water, flight is graceful and strong with relatively quick wing-strokes, may compete for nest site with Cattle Egrets

When present in Oklahoma: Can be seen abundantly statewide in summer, extreme southern section along Red River in winter

Habitat: Common in inland freshwater lagoons, lakes, marshes, meadows, flooded grasslands. Also found in coastal saltwater wetlands such as mangroves and mud flats. Occasionally seen in company of Tricolored Herons

Range: breeds mainly on central-southeastern US, winters along gulf coast in Florida, Atlantic coast, and tropics

Diet: fish, amphibians, aquatic invertebrates, and insects



Northern Cardinal

Cardinalis cardinalis

Description: 8-9" male bright red with crest, black face stout red bill, female buff-brown, tinged with red on crest, wings and tail

Habitat: Woodland edges, fields, thickets, brushy undergrowth, suburbs, gardens, feeders with sunflower seeds, swamps, desert washes, riparian areas. Very common in the east.

Nesting: 3-4 pale green eggs spotted with red-brown in a deep cup of twigs, leaves and plant fibers concealed in a thicket

Range: resident of eastern US south to Gulf Coast

Voice: rich *what-cheer*, *cheer-cheer*; *purty-purty-purty-purty* or *sweet-sweet-sweet-sweet* also a metallic *chip*

Diet: insects, fruit, and seeds

Notes: species named after red robes worn by Roman Catholic Cardinals, occupy territory year-round, forms winter flocks of 60-70

When present in Oklahoma: resident statewide year-round



Northern Mockingbird

Mimus polyglottos

Description: 9-11" Robin-sized, a slender, long-tailed gray bird with white patches on wings and tail, slender bill, white wing patches very obvious in flight, white outer tail feathers, back legs, sexes similar juvenile has spotted breast

Habitat: Open woodlands, suburban areas, gardens, pastures, thickets, hedges, towns, orchards, deserts. Male sings continuously for hours during the day or night. Often repeats vocalizations three times. Imitates many bird songs as well as other unusual noises. Common and widespread.

Nesting: 3-5 blue-green eggs, spotted with brown in a cup of sticks and weed stems, placed in a bush or low tree

Range: breeds from northern Canada and Michigan southward, winters south portion of range

Voice: a long series of musical and grating phrases, each repeated three or four times, often imitates other species

Diet: insects, including crayfish, sowbugs, snails, few small vertebrates; berries. Nestlings fed mostly insects, some fruit.

Notes: Conspicuous "wing-flashing" ostensibly functions to stir up insects and to distract predators, especially snakes, fiercely defends nest site will attack anything that comes near nest

When present in Oklahoma: common resident in state year-round



Red-headed Woodpecker

Melanerpes erythrocephalus



Red-winged Blackbird Female



Eastern Bluebird

Sialia sialis

Description: 7" bright almost iridescent blue above and on wings, tail, rusty throat and breast, white belly and undertail coverts, female similar but duller

Nesting: 4-6 pale blue eggs in a loose cup of grasses and plant stems in a natural tree cavity, old woodpecker hole, fence post or bird box

Voice: call a liquid and musical *tuee* or *queedle*, song a soft melodious warble

Notes: Making a comeback as people erect [bluebird houses](#), often successfully defend nest hole against swallows or House Sparrows (but not starlings), although sparrows occasionally kill bluebird adults and nestlings, female broods, winter flocks to 100 + ; often roost singly or in small groups in nest boxes.

When present in Oklahoma: present year-round state-wide, less abundant in panhandle

Habitat: Open woodlands, clearings, farmlands, parks, orchards, gardens, fields, along roadsides on utility wires and fences. Numbers declined due to competition from starlings and house sparrows for nest sites.

Range: breeds east of Rockies from southeast Canada to Gulf of Mexico, winters in southern portion of breeding range

Diet: insects, earthworms, snails, other invertebrates; especially berries. Young fed primarily insects. Hawking often from low perch, catching insects near ground. Very dependent on berries in winter.



Sandhill Crane

Grus canadensis



Scissor-tailed Flycatcher

tyrannus forficatus

Description: 14" of which more than half is a very long and deeply-forked black and white tail, adult has bright salmon-pink sides and belly, head, upper-back and breast pale grayish white

Nesting: 5 creamy brown-spotted eggs in a bulky stick nest lined with soft materials placed in a solitary, isolated tree

Voice: a harsh *kee-kee-kee-kee!*, also chattering notes like that of Western Kingbird

Notes: Spirited defender of territory against crows, hawks, etc. Gregarious in non-breeding season, Male performs acrobatic "[sky dance](#)" during courtship which even includes a few reverse summersaults in mid-air!

When present in Oklahoma: statewide during summer, south, southeast in winter months

Habitat: Open and semi-open country, roadsides, chaparral, ranches. Often seen perched on utility wires or fences.

Range: breeds from eastern Colorado and Nebraska south to Texas and Louisiana, winters mostly south of border and southern Florida

Diet: Almost entirely insects; few berries.



Trumpeter Swan

Cygnus buccinator



Whooping Crane

Grus americana

Description: 45-50" A very large, crane, pure white with only tips of wings black, red patch on forehead and cheeks, young birds similar, only tinged with brown, long-necked bird

Habitat: Freshwater marshes of Wood Buffalo National Park, Alberta. Winters in shallow coastal marshes of Aransas Wildlife Refuge, Texas Sometimes seen with Sandhill Cranes. Endangered.

Nesting: 2 buff eggs spotted with brown, in a large mound of grassy marsh vegetation

Range: breeds in Wood Buffalo NP on Alberta-Mackenzie border, winters at Port Aransas NWR in Texas

Voice: A trumpeter-like call which can be heard for several miles

Diet: Crustaceans, fish, small vertebrates, insects, small mammals; roots, berries, grain.

Notes: Intensive management and breeding programs have saved the Whooping Crane from extinction. Introduced flock in Idaho winters in New Mexico. Tallest flying bird in North America.

When present in Oklahoma: Stop-over for a few days each fall at Great Salt Plains NWR, usually around early November

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